



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/096,936	06/12/1998	TIMOTHY DARLAND	CDR97007	2377

25537 7590 11/28/2007  
VERIZON  
PATENT MANAGEMENT GROUP  
1515 N. COURTHOUSE ROAD  
SUITE 500  
ARLINGTON, VA 22201-2909

EXAMINER
----------

SHAH, CHIRAG G

ART UNIT	PAPER NUMBER
----------	--------------

2616

NOTIFICATION DATE	DELIVERY MODE
-------------------	---------------

11/28/2007

ELECTRONIC

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

patents@verizon.com

# Office Action Summary

Application No.

09/096,936

Applicant(s)

DARLAND ET AL.

Examiner

Chirag G. Shah

Art Unit

2616

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

## Status

- 1) ☒ Responsive to communication(s) filed on 9/13/07.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

## Disposition of Claims

- 4) ☒ Claim(s) 1-14, 16-22 and 30-35 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 23-39 is/are allowed.
- 6) ☒ Claim(s) 1-14, 16017, 20-22 and 30-35 is/are rejected.
- 7) ☒ Claim(s) 18 and 19 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

## Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

## Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

## Attachment(s)

- |  |   |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                       | 5) <input type="checkbox"/> Notice of Informal Patent Application                       |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

## **DETAILED ACTION**

### ***Response to Arguments***

1. Applicant's arguments filed 9/13/07 have been fully considered but they are not persuasive.
2. Applicant argues that if element 300 is the "programmable switch," hub 324 is a part of that "programmable switch" and, therefore, cannot be "coupled to said programmable switch," as claimed in claims 1-17. Applicant further argues, with regard to claim 30, and claims 31-34 dependent thereon, the Examiner identifies switch 300 in Erwin et al. as the claimed switch, and hub 324 in Erwin et al. as the claimed switch controller. But claim 30 requires the switch controller to be configured to generate program instructions to the switch, clearly implying that the switch and the switch controller are separate entities since a component does not generate instructions to itself. Examiner respectfully disagrees and redirects Applicant Erwin et al. reference specifically to fig. 3 and col. 8, lines 11-20. Erwin et al. clearly discloses in the respective sections that the hub 324, router 322, modem 320 and terminal 318 are not a part of the switch 300, but are external device connected or coupled to the switch 300. This is evidenced by disclosing the primary and secondary management servers can be directly or indirectly coupled via the router, hub or the modem. Furthermore, how can hub 324 and router 322 both be inside the switch. The figure 3 merely suggests that switch 300 is coupled to hub 324, router 322, modem 320 and terminal 318, which can control the switch to be remotely controlled and managed providing programmable instructions. Therefore, based on the prior art reference and the logical response to the arguments presented rejected respectfully remain unpatentable.

3. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

*Claim Rejections - 35 USC § 102*

4. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

5. Claim 1-14, 16-17, 20-22, and 30-35 rejected under 35 U.S.C. 102(e) as being anticipated by Erwin et al. (H1,802), hereinafter referred as Erwin.

Regarding claim 1, an intelligent service network [call processor system see fig. 3],  
comprising:

a programmable switch [switch 300, see fig. 3]; and

a switch controller [Hub 324, see fig. 3] coupled to said programmable switch [switch 300, fig. 3], and including a service control means [call processor 312] for interfacing with (via Hub) an intelligent service network component [network management server] of said intelligent service network [see fig. 3 and col. 7, lines 12-22, 38-48, 55-60 and col. 8, lines 30-38, where the call processor includes call processing application control means for providing various call processing and signaling function and interfaces network management servers via hub, network switching modules and servers for sending signaling and call control data].

Regarding claim 2, further comprising: an intelligent service network component [primary and secondary management servers 314] coupled to said switch controller [Hub 324, see fig. 3 and col. 7, lines 38-48].

Regarding claim 3, wherein said switch controller [Hub 324, see fig. 3] further comprises: a programmable switch support means [interface of the hub 324] for providing an interface to said programmable switch [switch 300]; and a call control means [call processor 312, see fig. 3 and col. 7, lines 12-22, 38-48, 55-60 and col. 8, lines 30-38] for establishing a connection between ports on said programmable switch.

Regarding claim 4, wherein said switch controller [hub 324] further comprises: a resource control means for allocating resources [see col. 8, lines 55-65, where the call processor is operable to transfer/allocate the format data from the storage device to other components of the telecommunication switch].

Regarding claim 5, Erwin discloses in fig. 3 wherein the switch controller [Hub 324 of fig. 3] further comprises: management interface [network management server interface] means for providing an interface to external management systems [routers].

Regarding claim 6, Erwin discloses in fig. 5 and in col. 10, lines 38-67 of the intelligent programmable switch [switch 300, see fig 3] includes a digital exchange [digital signal processor, see col. 10, lines 38-67].

Regarding claim 7, Erwin discloses wherein said intelligent service network component comprises one of an operator console, an automated response unit, a service switching control point, and a protocol converter [see col. 5, lines 18-20 and 37-50, where the telecommunication switch preferably includes one or more switching module for performing switching operations].

Regarding claim 8, Erwin discloses in fig. 3 and col. 6, lines 66-to col. 7, lines 4 wherein said intelligent service network component comprises one of a means for accessing data [telephony support module 304], and a means for interfacing [the interface module 306] with a caller.

Regarding claim 9, Erwin discloses wherein said intelligent service network [call processor system 312] component comprises one of a network information distribution system database [primary network management server 314] coupled to said switch controller [switching module 302] via a network information distribution system server, an applications database, a

Art Unit: 2616

data distribution system database, and a mainframe database [see fig. 3 and col. 7, lines 12-22, 38-48, 55-60 and col. 8, lines 30-38].

Regarding claim 10, further comprising: a system management system [primary network management server 314] coupled to said switch controller [Hub 324, see fig. 3].

Regarding claim 11, further comprising: a force management system [primary network management server B 314] coupled to said switch controller [Hub 324, see fig. 3].

Regarding claim 12, further comprising: a configuration and provisioning system [see col. 7, lines 38-48] coupled to said switch controller [Hub 324, see fig. 3].

Regarding claim 13, further comprising: another programmable switch coupled to said switch controller [see col. 8, lines 20-38, where another telecommunication switch is coupled to hub].

Regarding claim 14, further comprising: another intelligent service network component coupled to said switch controller [see col. 8, lines 20-38, where another telecommunication switch containing the call processor system 312 is coupled to a hub].

Regarding claim 15, (Canceled)

Regarding claim 16, further comprising: another switch controller [switching module 302]; and one or more intelligent service network components coupled to at least one of said switch controllers [see col. 8, lines 20-38, where the call processor system sends signaling and call control data to another telecommunication switch].

Regarding claim 17, further comprising:

another programmable switch [see col. 8, lines 20-38, where the call processor system sends signaling and call control data to another telecommunication switch]; and

another switch controller [hub], wherein each of said switch controllers is coupled to at least one of said programmable switches [see fig. 3, where call processors or switching modules is coupled to hub] .

Regarding claim 20, Erwin discloses messaging interface [hub 324], comprising:

a means [hub interface] for communicating with a programmable switch [switch 300] using a programmable interface messages [interface module 306 and 304]; and a means [hub interface] for communicating with an intelligent transmission control messages [network management server] using programmable switch service network component [call processing and signaling functions, see col. 7, lines 11-48 and fig. 3].

Regarding claim 21, further comprising: a means for communicating with a system management system using system management messages [see col. 7, lines 11-48 and fig. 3, call processor system communicates with primary management server via Hub].



Regarding claim 22, further comprising: a means for communicating with a force management system using force management messages [see col. 7, lines 11-48 and fig. 3, call processor system communicates with secondary management server via hub].

Regarding claim 30, Erwin discloses in fig. 3 and col. 7, lines 12-22, 38-48, 55-60 and col. 8, lines 30-38 of a communication system for providing telecommunication services, comprising:

a switch [switch 300, see fig. 3] configured to process a call received from a telephony network according to program instructions; and

a switch controller [hub 324, see fig. 3] configured (via interface) to generate the program instructions to the switch for distributing the call to a plurality of network components [302, 304 and 306] based on availability of the network components, wherein the network components and the switch controller [hub in association with call processor, see fig. 3] are connected over a common data network [see data network of fig. 3].

Regarding claim 31, Erwin discloses in fig 5 of wherein the plurality of network components [304 of figs. 3 and 5] include an intelligent peripheral [call control manager 518 and 520] configured to provide one of operator services, and voice response services based on the received call.

Regarding claim 32, wherein the plurality of network components [304 of figs. 3 and 5] include a network information distribution system configured to access data including one of customer account information, call routing information, and prepaid call information in response to the received call [see col. 9, lines 46-64].

Regarding claim 33, Erwin discloses wherein the plurality of network components [304 of figs. 3 and 5] include a protocol converter configured to converting protocols of an external resource to a protocol compatible with the data network [see col. 5 lines 48 to col. 6, lines 6].

Regarding claim 34, wherein the plurality of network components [304 of figs. 3 and 5] include a management system configured to provide one of work force management, provisioning of resources, and configuration of the resources [see col. 7, lines 38-48 and col. 8, lines 20-38, where call setup functions to provisioning and configuration take place].

Regarding claim 35, Erwin discloses in fig. 3 and col. 7, lines 12-22, 38-48, 55-60 and col. 8, lines 30-38 of a method for processing a call in a telecommunication system including a plurality of network components [302, 304 and 306] communicating with a switch [switch 300, see fig. 3] that is capable of being programmed and having a plurality of ports [see fig. 3 switch with plurality of ports], the method comprising:

transmitting program instructions [hub 324 transmitting via interface] program to the switch [switch 300 having a call processor] for answering a call received by the switch [switch 300] from a telephony network and for selectively [call processor 312] distributing the call to

Art Unit: 2616

one of the ports corresponding to the network components based on availability of the network components, wherein the network components [302, 304, 306] having connectivity to a common data network[call processor network see fig. 3].

### *Allowable Subject Matter*

6. Claims 23-29 allowed.
7. Claims 18-19 objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

### *Conclusion*

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Chirag G. Shah whose telephone number is 571-272-3144. The examiner can normally be reached on M-F 8:30-5:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Lynn Feild can be reached on 571-272-2092. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 2616

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

cgs

November 20, 2007



Chirag G. Shah  
Primary Examiner, 2616

CHIRAG G. SHAH  
PRIMARY PATENT EXAMINER